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SLEEP—SLEEPLESSNESS.

ALTHOUGH every one is familiar with sleep, and knows it to be a period of perfect repose, it is only within the present generation that any considerable progress has been made as regards the physiology of the phenomenon. Forty years ago the question, 'What is Sleep?' would have proved almost unanswerable. A writer on Physiology in 1835, speaking of the phenomena of sleep: 'Of these phenomena we frankly confess we can assign no physical cause that is satisfactory.' And again: 'The present state of physiology is so limited that we cannot assign any precise physical cause for the natural kinds of sleeping and waking, nor for their regular periods of return.' Since then, much has been accomplished; and we may at length attempt to point out adequate physical causes of those interesting phenomena with which countless generations have been familiar.

During sleep, the action of the lungs, the heart, and the stomach still continues, but in each case more slowly than during the waking hours. One great organ, and only one, appears at first sight to be completely torpid—namely the brain. In thoroughly sound healthy sleep, the sleeper seems sunk in absolute dreamless unconsciousness; the brain appears wholly and entirely inactive. This is however, not altogether the case. The difference between this and the other great organs of the body is one of degree only, not of kind. The brain does not cease its functions entirely. During life, in fact, that is impossible. Life consists in motion; hence a complete cessation of action on the part of any one of the great organs of the body means the stoppage of all the others and the dissolution of the system. The brain therefore, notwithstanding the lethargy and unconsciousness in which it appears to be steeped, exerts still a large amount of force. That fact however, being admitted, it is nevertheless plain that the brain is the organ chiefly affected, and the one therefore which demands especial study, if we would understand the phenomena of sleep.

Experiments have accordingly been conducted

with this object. Advantage has been taken of the necessity of trepanning in the case of human beings, and dogs also and other animals have had portions of the skull removed, and in each instance glass has been used instead of the usual gold plate to replace the bone. By this means the various changes in the appearance of the brain have been accurately observed. During the waking hours, the brain is seen to be full of blood, and presses with much force against the skull, insomuch that in those cases in which the portion of bone removed had not been replaced by any other substance, the brain protruded considerably. From experiments made in France some fifteen or twenty years since, it was observed that in the state of profound sleep the brain became pale and ceased to protrude through the opening in the skull, or press against the glass, as the case might be. It thus became evident that the unconsciousness of sleep resulted from a large diminution in the active circulation in the brain. And it was further noticed, that when the animal or person experimented on was observed to give evidence of dreaming, by movements of the limbs—barking in the case of dogs, or speaking in the case of human beings—the pressure of blood in the brain obviously increased. Thus proving that the partial activity of the sentient faculties during sleep, which we call dreaming, is really a partial resumption of the normal waking circulation of blood through the brain. In other words, when a person dreams, his sleep is not sound. He is partially awake. The curious feature in dreaming is that certain faculties being dormant, fail to control the imagination; the consequence being incoherent fancies, and shreds of remembrances tagged together in perplexing confusion. The imputing of anything serious to dreams is therefore mere idle folly. Whatever over-stimulates the circulation of the brain causes imperfect sleep, if not absolute sleeplessness.

Although sleep is a natural and involuntary state, it may be greatly promoted by maintaining a good state of health; by daily open-air exercise, or by riding or sailing with the face exposed to

the air ; by having the stomach free from a heavy meal, or any indigestible substance ; and by the mind being undisturbed with cares. Over-fatigue, indulgence in food or drink beyond what nature requires, want of proper exercise, and mental disquietude, are all causes of sleeplessness. Breathing in a confined or overheated apartment is also a not unusual cause of broken slumber. The temperature most suitable for sleep is about sixty degrees, which gives the sensation of neither heat nor cold, and admits of a moderate amount of bed-clothes being used.

The best posture for sleep is to lie on the right or left side, with the arms crossed over the breast in front, and the head well up on the pillow. The mouth should be shut, so that the breathing may be carried on exclusively through the nose. Some persons acquire a habit of sleeping with the mouth open, which causes the grotesque and offensive action of snoring. Going to sleep while lying on the back should be avoided, as, besides inducing the sleeper to snore, it is apt to cause disturbing dreams.

When lying down to sleep, the mind should be as composed as possible. Thinking ought to be guarded against, as productive of wakefulness. Those who, from nervous irritability, are habitually bad sleepers, resort to various expedients to secure the blessing of repose. One of the most successful plans consists in mentally repeating a familiar poem or psalm, so as to alter the train of thought, and lull the consciousness.

It is a well-ascertained fact that sleep begins at the extremities ; the feet sleep first, and then the rest of the person. On this account, in order to fall asleep, we require not only to compose the thinking faculties, but to keep the feet still. The feet must also have an agreeable warmth. With a consciousness of this fact, the North American Indians and others who are in the habit of bivouacking in the open air when on distant expeditions, sleep with their feet towards a fire which they kindle for the purpose.

Certain drugs act as an opiate and produce sleep, when ordinary means fail ; but these should never be taken unless by medical sanction. The practice of using opiates is most detrimental to health ; and if persevered in, is ruinous to the constitution. Coffee and other beverages act variously on different individuals. They exhilarate some, and others they send to sleep. Tea usually acts as an exhilarant, by stimulating the nervous system, and should not be taken less than four hours before going to bed.

While it is ascertained that sleep is connected with the state of the brain, there remains the extraordinary fact that some persons possess the power of summoning sleep by an effort of the will. Napoleon Bonaparte is known to have possessed this faculty. During his campaigns, when no regular repose could be taken, he embraced opportunities of sleeping for a quarter of an hour, or some other short period, and of waking up exactly when the assigned period had expired. This subjection of sleep to the action of the will is in practice comparatively rare. More commonly, habit and predisposing conditions, such as darkness and quiet, induce sleep. There are occasions however, when, owing to great fatigue for example, an uncontrollable heaviness and drowsiness will cause a man to drop to sleep

in a moment even in the most uncomfortable positions and amid light and noise. But an attentive consideration of this invincible drowsiness, due to long watching or over-fatigue, throws great light on the primary cause of healthy sleep and of the periods of its return. We begin to perceive that the diminished pressure of blood in the brain is after all only a leading and important symptom of a general physical state ; and in bringing about the condition of altered and lessened activity of all the organs which we observe during the period of sleep, some one organ must assume the initiative. And reflection assures us that this physical first cause is the nerve-force of the body which, centred in the brain, controls the whole system. Sleep is the means by which this force is recruited, no more of the force being expended than what is necessary to maintain the action of the involuntary muscular movements of the lungs, the heart, and the stomach.

On waking, the eyes are opened, one rises, one walks and works, one eats and drinks ; and especially—in some cases at all events—one thinks. Every one of these operations, more particularly the thinking, involves an expenditure of nervous force, is a tax on the vital energy, and diminishes to that extent that fund of nervous force on which all the complicated functions of the body depend for their healthy exercise. After this great flow of and strain on the nervous force, there sets in an opposite and compensatory movement, an ebb and relaxation of nerve-force, and this produces the phenomenon of sleep. Of course it is possible, by means of stimulants or excitement, to counteract this natural reaction of the system, and for a time to ward off its result. But that only amounts to saying that it is possible to live on one's capital instead of one's income. Nature in due time will take her revenge. To maintain health, the expenditure of nervous power during the waking hours must be balanced and compensated by an equivalent proportion of sleep. Consequently we find that since mental work is more exhausting to the nervous energy of the brain than muscular exertion, even so must it be made up for by an increased amount of sleep.

We have now obtained, it may be hoped, a true picture of sleep, and the controlling physical causes of its wonderful phenomena. Physiology—no longer altogether ignorant or silent—explains the most marked and, at first sight, strange and inexplicable feature—namely the unconsciousness, by pointing to the pale and bloodless brain, free literally for the time from the pressure of the waking hours. Yet, whether the mind during sleep be as absolutely still and inactive as it seems to be, is an interesting problem. Most remarkable would it be, should it appear that during sleep, powers are exercised by the mind, of which there is no trace during the waking hours. And such is, we have some reason to suppose, actually the case.

Nothing is more strange than the inability of man during his waking hours to measure or estimate the flight of time by any mental effort apart altogether from the observation and aid of external objects. That one should wake after the lapse of the number of hours spent in sleep to which he is accustomed, would not be surprising ; the nerve-force having been recruited by the normal

period of rest, again resumes its activity. But that one should be able to *limit beforehand* the duration of sleep, might seem clearly impossible, in view of our presumed inability to measure or keep count of the lapse of time. Suppose one were to lie down, close the eyes, keep awake, and without any aid from sounds, attempt to get up again at the expiration of two, three, or four hours; does any one pretend that the reckoning of time would be other than mere guess-work, or that the guess would be at all likely to be near the mark?

Yet there seems much ground to suppose that the power to do this during sleep is common to all, although more or less dormant in most. Servants and others whose usual hour for rising may be six, find little difficulty in awaking at five or four, or indeed at any hour that may be fixed on the previous night. In fact, by determining beforehand to wake at a certain hour, especially if it be on important business, any one may exercise the faculty. The writer of this paper is naturally a sound and even heavy sleeper; nearly all his life he has depended on others to rouse him from sleep at the hour for rising; habit therefore, as well as constitutional predisposition, was unfavourable to any limitation of the duration of sleep by an act of will; yet on more than one occasion, and it may be added much to his own surprise at the time, the writer has awakened precisely at a desired but very unusual hour. In such a case as this, one instance is as astounding as ten thousand. The marvel is not of number; but that while the waking man is so helpless in this regard, so easily misled by his emotions and the current of his thoughts, so little able to measure time aright, so dependent on external aid; the sleeper, unconscious, unheeding friends or foes, lost to all that is taking place around him, is yet able to measure—accurately now—the flight of time which he appears to have forgotten, and return at an appointed hour to the world which he was hardly conscious of having left.

There are doubtless other aspects of the psychology of sleep, and other problems arising out of a consideration of the subject, of great importance and interest; but none probably stranger or more worthy of study than this power of limiting the duration of sleep by an act of will.

YOUNG LORD PENRITH.

CHAPTER IX.—IN ST MARY'S BAY.

It often happens that sportsmen, with all appliances and means to boot, find the time hang heavily on their hands. It is not cheerful, the hour spent on damp heather, beneath a gray rock in the Highlands, before experienced Donald comes to pronounce that, if the wind does not shift and nothing happens, fifty minutes of penitential crawling among stony places may bring one within rifle-range of a browsing stag. Those half-hours spent beside the outer edge of a dense wood, within which the hounds give spasmodic yelps, and whence a fox may break in any conceivable direction but the right one, are the reverse of enlivening. And so it is, sometimes, in business. Hugh Ashton, for one, was bent on business. Yet it tormented him that the *Western Maid* lay so steady on the sea, gently heaving, but otherwise absolutely motionless.

In the Mediterranean the weather would but have harmonised with the scenery and the surroundings. There would have been the violet sea, the violet sky, the sharp outlines of the coast, the thin transparent air, bringing remote objects near to us, that some of us know so well. But in West Cornwall it was entirely different. There Nature's alchemy gave a blended haze of gold and silver and sapphire, of mist and haze, and brightness and shimmer, prettier, softer, more vague, than anything on which southern eyes ever rested.

Long Michael kept strict watch. The crew were eager and ready. The sooty gnomes below hatches were prepared to 'fire up' at a word; but for weary hours the word remained unspoken, and the pilchards declined to come in. Something—who could tell what—had frightened the scouts of the gleaming shoal, and the whole army, clad in silver mail, kept out in deep water and hesitated to advance. They might head back altogether. They might trend off towards France or Wales. They might hang for weeks about the Land's End, thinned by the multitudes of dog-fish and porpoises that tracked them as wolves track sheep, and then be broken up and dispersed by the rough weather of the equinox. Their presence meant comfort to humble dwellings. Their absence meant the pinch of poverty.

'Fish, ho!' They were coming closer in. The shrill cry from watchers who, with straining eyes, craned over crags and clung to projecting stones; a shrill cry that boded well.

Hours went by. Hundreds of red sails, white sails, brown sails, dappled the sea, and scarcely came a breath to stir them. There was a golden film like gilt gossamer over the softly heaving sea. There were, to artists, impossible effects of green and silver in the western distance.

While awaiting the call to activity, Hugh Ashton had time enough to inspect the vessel under his command. The *Western Maid* was a trim little steamer, only too elegant in her build and coquettish in her neatness, as some might have thought, for the humble sphere of her vocation. A tug-boat is usually a rusty, bluff-bowed little prodigy of useful ugliness, puffing volleys of Acherontic vapour from her stumpy smoke-stack, and churning up the waves with grimy paddle-wheels.

'All my lady's doing!' said the mate, in reply to Hugh's remarks on this point. 'She insisted that the Board should contract with a firm of famous ship-builders, instead of buying, as the rest wanted to do, a brace of cheap tubs, second-hand. And she keeps us as tant and smart as a recruiting-sergeant in his ribbons, just as she will have patent ploughs and steam-thrashers and improved drain-tiles on her property. Some folks grumble, but my lady does a mort o' good.'

It was evident that Long Michael was a loyal vassal to the autocratic Dowager up at Llosthuel. It was none the less manifest that he was a thoroughly good fellow, without an atom of malice or envy at the bottom of his honest heart. That he should resent a younger man's being put over his head, while he still remained mate of the steamer, would have been unjust, probably, but extremely natural. Such was not however, Michael's own way of regarding Hugh's promotion. 'I'm no scholar,' he said modestly; 'never

could get the pith and marrow out of a printed book. And, though I can scuffle along, I can't navigate, and never sailed foreign but once, when I was cabin-boy aboard a Plymouth barque out in the Azores for oranges. A mate's berth's the right sort for me.'

It was deep in the afternoon, and the sloping sun had flung a royal highway of burnished gold across the mysterious waters to the west, before a shriller scream than had been heard before came peeling from the cliffs. 'Fish, ho!' The cry was caught up, echoed, repeated, confirmed from crag to crag. Not a doubt of it, the shoals were coming in. Still, there was no hurry. The Armada of fishing-vessels lay motionless yet, as prudence dictated, until at length a fresh call, louder, wilder, more jubilant than before, rang out: 'In shore! Fish, ho!' And then there was no more silence, no more inaction. Every sail was trimmed to make the most of the faint breeze that blew in catpaws, ruffling the water, and then dying away. Out came the heavy sweeps, tugged at by sturdy arms, to force the lugger along through the still sea. Oar and sail did their best; but it was late; and the declining sun burned crimson in the distance, before the leading smacks were able to form in crescent order, and spread their acres of net for the insnarement of the finny spoil. Loud shouts from time to time resounded. There was little need for caution now. The fish, fairly embayed, could easily be cut off from their line of retreat to the depths of ocean.

Hugh, new to this animated scene, chafed at the delay; while the crew bustled feverishly to and fro, longing to join in the onslaught on the pilchards; but Long Michael shook his grizzled head.

'Wait till we're wanted, Cap,' he said. 'There's chaps among the Enterprisers would find fault, and perhaps law the Company, if our very wash put a net awry. Plenty of work for all!'

At last, when the twilight was darkening into evening gloom, came over the waters the far-off hail: 'Ahoy! steamer! *Western Maid*, ahoy!'

'Now it's our turn, Cap,' said Michael cheerily; and, with engines working at reduced speed, the steamer threaded her way into St Mary's Bay, crowded with sails of many colours. A picturesque scene it was. On shore, fires were burning brightly, and torches gleamed with ruddy light, and excited groups of workers ran hither and thither, or clustered thickly around the fires; for there is always work in plenty to be done before the captured fish can be stowed away, layer above layer, in barrels neatly headed, branded, and ticketed for exportation. The curing, the packing, and the conveyance of the spoil give employment for the time to many hundred people.

But the chief interest to Hugh's unaccustomed eye was in the spoil itself, in the live silver that leaped and struggled, striving to burst the nets; trying to slip through the meshes; and sometimes, by dint of sheer weight, breaking through the cruel toils that environed the glittering captives by myriads. There was hauling and dragging; there were orders hoarsely shouted; the bronzed giants in sea-boots and blue or red shirts, bending their brawny backs over the gunwale, have enough to do; the boys tug, gasping, at the ropes. There is much talk, some reproach, a trifling amount of

praise, and some strong language, since nobody at pilchard-fishing, as in a storm, picks his words.

Long Michael was the guiding spirit as concerned the *Western Maid's* share in the work to be done. Work that must be done, like Ariel's spiritings, gently. Well done, nameless engineer below, whose fine touch played on the levers that kept the *Western Maid's* throbbing heart of steam precisely at the right speed, stopping now, stealing on a pace, and anon forging ahead, just as a skilled organist brings out the powers of his instrument! Well steered, helmsman, whose dexterous hand and watchful eyes were never for an instant idle! And well managed, honest Michael, to whom it would have been so easy to discredit his young chief by the negligence of a moment, had there lurked a spark of malevolence in his honest mind, but who had never been so careful that no shadow of blame might attach to the repute of the steamer, as on the maiden day of Hugh's new command!

The steamer had helped, and helped well, to further the work of that evening. Overgorged seines, full to the throat with struggling fish, had been by her gentle but resistless force drawn to shore. Smacks lying helpless on the still sea had been by her towed into snug stations. And Long Michael, exact in business matters as he was careful in affairs of seafaring, had got from every boat's skipper the due acknowledgment that would enable the Company to claim what was fairly owing for help in time of need.

At length the work was done. The last of the weighty nets had been dragged heedfully over reef and shingle to dry land. The packers and curers were as busy as flies around honey. The fires blazed. The dark figures of those who toiled around them flitted to and fro across the patches of flickering light like images of a magic-lantern. Suddenly in the glare of the torches appeared a group of sight-seers, at once distinguishable by their garb and bearing from the bulk of those around. There were several ladies and two or three gentlemen.

'Quality, no doubt come down to see a sight worth looking at, as happens most years when the day's a fine one,' said Long Michael. 'Yes, yon's my lady herself in front—Lady Larpent, I mean,' he added, thinking that Hugh had not understood his words. But already Hugh Ashton had caught sight of the graceful girlish form at the Dowager's side, and he had scarcely eyes or ears for any other sight or sound than Maud's face, Maud's voice. Hugh sprang into a boat, one of several boats that were alongside the steamer, and in a minute was on shore. Lady Larpent smiled and nodded with unaffected pleasure as the new commander of the *Western Maid* came up to offer her his thanks for her generosity, and to explain the reasons which had prevented him from already presenting himself at Llosthuel.

The Dowager, who like most of her sex, was much influenced by external advantages, acknowledged to herself that the young man looked singularly handsome as he came up to meet the party from the Court, and that he played the difficult part of being grateful without a touch of servility, very well. The gold-laced cap that he lifted in salute became him well when it rested on his dark hair and broad forehead. The boys Edgar and Willie were demonstrative in boyish fashion, as to their welcome. Maud was very

silent; but she put out her little hand, by a quick impulsive feeling, for Hugh to take; and Sir Lucius frowned till his dark brows met ominously as he noted this.

'A picturesque spectacle,' said the Dowager, looking around her. 'I have often seen it before; but to some of us, to my niece in particular, it is a novel sight.' Then Lady Larpent proceeded to say that it was growing late and dark, and that there was a long homeward drive in prospect, and presently the party from the Court returned to the carriages in waiting near the beach. 'I shall be happy to see you, Mr Ashton—Captain Ashton—at Llosthuel to-morrow, if you can find the time to come,' said the Dowager graciously. And so the carriages drove off. And thus did Hugh Ashton and Maud Stanhope meet again.

THE YORKSHIRE PENNY BANK.

PENNY BANKS are of recent origin. The earliest, as far as we have heard, began at Leeds, in Yorkshire, in May 1859. As the name imports, the object was to promote the deposit in a bank of so small a sum as a single penny, and thereby encourage saving habits on the humblest scale. The idea took amazingly. So successful was the Yorkshire Penny Bank, as it was called, that in April 1860, it had already fifty-eight branches opened, and the deposits had accumulated to nearly eighty thousand pounds. We wish to make known the nature of the undertaking.

The Yorkshire Penny Bank is not in any sense a commercial undertaking for the sake of gain; it is an association founded solely with the following objects. First, 'The receiving deposits for safe custody and investment, the keeping and investment of the same, and the repaying the amount with interest to the depositors.' Second, 'The doing all such other lawful things as are incidental or conducive to the attainment of the above objects, or any of them.' It follows of course that there are no dividends, bonuses, or divisible profits; indeed any such motives are at once emphatically prohibited in the association's Board of Trade license. In short, it is simply a great mission formed for the purpose of inculcating thrift upon the poorer classes in the vast county of York, within the area of which, by its name and its license too, its operations are confined; or to be accurate, a latitude of ten miles beyond the county is allowed. Officially described, the association is a 'Joint-stock Company,' being limited by guarantee; that is to say, no shares are taken up in it; but a certain number of gentlemen have given their names as security, so to speak; and by signing the articles of association, have guaranteed an amount, which is placed opposite their names. In the event therefore, of any untimely end or liquidation of the bank—which however, is not feared—these members are liable to be called upon to pay the whole, or such part as may be required of the sum they have made themselves responsible for. There are at the present time upwards of one hundred such members, although the number can, if desired, be increased to five hundred. Among these guarantors—as they are officially styled—we notice a host of honourable and distinguished names, many being dukes, marquises, earls, judges, privy-councillors, &c.; and with such strong support one would only

be surprised if the institution did not flourish. In 1877 the bank had a reserve fund, invested in government securities, amounting to more than twenty-eight thousand pounds, which had accrued from an accumulation of profits after all working expenses and interest on deposits had been cleared, added to the original subscriptions of the guarantors; the income thus derived being now the primary fund for paying salaries, rent, commission, and other expenses incurred in the carrying on of the business; current profits being only used to defray the balance of such expenses. The principal of the fund is as far as possible kept intact.

The head office of the Yorkshire Penny Bank is at No. 2 East Parade, Leeds; and the county is divided into thirty-nine districts, each having one or more branches; the total number now established amounting to nearly five hundred. The largest is the Leeds district, which has about seventy branches; and the Halifax and Bradford districts come next in point of numerical strength. Each district has a treasurer, and generally also a banker; while every branch has an actuary and several managers, numbering never less than two. There is an allowance of ten shillings per cent. per annum on the amount belonging to each branch, made to cover the expenses of managing the branches; and also one shilling for every hundred transactions—that is, deposits and withdrawals; and these allowances are generally given to the actuary as a slight remuneration of his services. But the managers give their services and time gratuitously to the mission, being actuated by motives of pure philanthropy and charity. The whole of the extensive system is under the direction of a general manager, aided by a sub-manager and a staff of paid officials. The accounts are periodically thoroughly investigated and audited, and are presented to the annual general meeting of directors held at Leeds, usually about March.

The great aim of this institution being, as already said, to inculcate thrift and the spirit of saving upon the minds of the poorer classes in the county in which it has been established, it follows of course that all the rules and regulations are accordingly based upon the principle of affording every facility and assistance for the accomplishment of so praiseworthy an object. Deposits of any amount from *one penny* upwards may be made; and there are no restrictions as to withdrawals, for which, as regards the branch banks, a week's notice must be given for sums not exceeding five pounds; and a fortnight's notice for all larger amounts. In the case however, of the central bank at Leeds and those places at which daily banks have been opened, depositors are allowed to withdraw their money to the extent of twenty pounds without any notice at all; and those depositors who have a balance of twenty pounds or more standing at their credit, may withdraw their money by cheques under such restrictions as the Board of Directors may deem advisable to impose.

Interest at the rate of three per cent. per annum is allowed on deposits of one pound and upwards which remain in the bank for the period of one calendar month or more; but no interest whatever is allowed upon smaller sums or on deposits of less than a month's duration. It is also in the power of the directing Board to open investment

accounts for sums of not less than fifty pounds, which must remain in the bank not less than three calendar months, on which interest at the rate of three and a half per cent. per annum is allowed, such deposits being subject to one month's notice of withdrawal.

Having thus briefly glanced at the system and organisation of this astonishingly successful county institution, it would be unfair to leave the subject without turning our attention for a few moments to the results achieved. We are loath to introduce figures into a paper intended for popular reading, but we cannot refrain from giving the following, because they tell such a wonderful tale of what can be done by a private enterprise in a 'mere county,' albeit it is the largest in the kingdom. The last Report to which we have had access, namely that for 1877, records 791,873 as the total number of deposits in that year; being an increase of 71,802 over the deposits of 1876. The amount deposited was L.650,714, 17s. 9d.; giving an increase of L.187,911, 7s. 3d. over the previous year. The number of withdrawals was 104,335, and the amount L.513,738, 8s. 5d. There were 100,158 open accounts at the end of 1877; and the total amount standing to the credit of depositors at the end of that year, L.811,685, 13s. 1d. This was the largest increase of the bank's business in any year since its establishment, and is the more satisfactory from its having been effected with comparatively little exertion on the part of the officers of the institution; for, said the Directors, 'It is not now, as formerly, that your officers have to travel over the county persuading gentlemen to open branches; the Penny Bank system has become a recognised institution; and those who are desirous of training up the young in habits of prudence, forethought, and self-denial, now readily avail themselves of the opportunity held out by the branch to foster and carry out these commendable duties.' We have only to add by way of figures that L.5520, 10s. 2d. were made as profit in the year 1877, and carried according to the rules to the Reserved Fund Account, thereby raising this fund to L.28,099, as previously stated. And now turn we to the moral effects and influences of the bank.

The cardinal principle of the Yorkshire Penny Bank—as pointed out by Colonel Akroyd, ex-M.P., its chief founder we understand, and present President of the Directors—is *to help the poor to help themselves*; and in this great aim we have every reason to believe it is admirably successful. Dr Samuel Smiles cannot but be thoroughly gratified by this most practical illustration of his popular work *Self-help*, afforded by the fruitful results of this missionary institution, which might appropriately take the title for its motto. But besides its success in impressing upon the poorer classes of the immediate neighbourhood in which its most useful and beneficial work is carried on, the inestimable benefits to be derived from thrifty and saving habits, the Yorkshire Penny Bank does a world of good in what may be termed an extraneous sphere. It brings many individuals of the community closer together, gives them an object of common interest, and creates between them a bond of sympathy that otherwise would probably be lacking. It tends too, in a very material degree we believe, to soften and tone down the rougher element of the poorer classes

amongst which the operations of the bank are prosecuted; and not only so, but it likewise appears to unite families more closely, and awakens that honest pride, that self-respect, or better still—as the French so aptly term it—that *amour propre* which is necessary for the success, the respectability, and the general welfare of any community.

Such influences as these are the more apparent in the country districts, where everybody knows everybody. Mr Peter Bent, present general manager of the Yorkshire Penny Bank, who is not only an indefatigable and adroit worker in that capacity, but also appears in the character of a close and keen observer of class temperaments and idiosyncrasies, seems to agree with us in this respect, and remarks that in these districts 'everybody knows when John Brown buys a pig, or when little Jimmy Short gets a new Sunday suit, or Sarah Smart gets a new bonnet and shawl or dress, &c.; and they have a shrewd guess, if not an actual knowledge, how they have got them. "Doesn't a know," one woman will say to another, "he's been saving money it benk?" And we fancy this very cognizance of one another's doings tends very greatly to spread the good work; for the knowledge and indeed ocular demonstration of the substantial benefits and comforts being derived by those who are 'saving money it benk,' create a fine spirit of emulation amongst those who have as yet not begun to save in any way.

Were we to attempt to record instances of the good that has been felt and done through the agency of this Penny Bank, we might easily run into more than a sheet of this *Journal*; but far from doing this, we have only space to say that such cases as a father being maintained during a long and tedious sickness *without parochial assistance*, by the bank deposits of his sons and daughters; a mother being decently buried by the savings (ten pounds) of her son; a poor man, by means of his bank savings buying himself the *first top-coat he had ever had*; parents putting by a shilling a week in order that their only son might have something when of age—are only two or three out of the host of illustrations on written record of the self-denial, the thrift, and moderate frugality which the Yorkshire Penny Bank has engendered amongst the humbler classes of the county it takes its name from. Its influence has also been used to good purpose in helping to smooth down 'class asperities,' as Mr Bent terms them, especially in the branch districts, for there the managers have excellent opportunities of saying kind words to or making gentle inquiries about the depositor or his family; which words we may be sure are always taken home and treasured by the circle.

It may be thought by some that the institution of Post-office Savings-banks tends to lessen the usefulness of the Yorkshire Penny Bank; but this is not the case. The figures we have already given prove this; for although at the time of the establishment of the postal banks, grave doubts were entertained as to whether there was any further necessity for the Yorkshire institution, the existence of the two concerns is not prejudicial to the interests of either, nor have they been found to clash in any way. The postal savings-banks offer the greatest convenience and accommodation

to those artisans and work-people who are of a migratory disposition, inasmuch as they can deposit or withdraw money at any of the more than five thousand Post-office banks now established throughout the United Kingdom. The Yorkshire Penny Bank reserves to itself the special duty of teaching the young of both sexes the habit of saving, and its attendant blessings; and also affords a convenient receptacle, brought close to their homes, for the savings of adults. The two institutions thus work smoothly and peaceably side by side; and so far therefore as the advantages, influences, and general good briefly mentioned above are concerned, we can create no ill-feeling in heartily wishing continued success and prosperity to the philanthropic work of the Yorkshire Penny Bank. Let us hope too that our brief account of the work may not only evoke admiration as to its results, but may also excite a spirit of emulation in other counties of this populous country, and that benevolent-minded gentlemen may be induced to follow in the steps of their Yorkshire compatriots by organising similar penny banks.

THE ADVENTURES OF A LADY HELP.

CHAPTER III.

MATTERS went on much in the same way for about a month. I was often taken out sight-seeing and visiting when Mr Dykes was of the party; and as he generally brought two or three young men with him, the girls were well pleased, and amused themselves to their hearts' content, except perhaps Amelia. But I did not care for these expeditions, and often longed to decline them from sheer fatigue, having plenty of needlework and much running up and down stairs. Besides, I daily dreaded receiving a proposal from Mr Dykes, and had only managed to avoid it so far by the greatest vigilance. At last I found a way out of my difficulty. Amelia gave me a strong hint that people should keep in their places and mind their work. The remark was addressed to the luckless Jane, but was so palpably meant for me, that I willingly took it to myself, and firmly declined any further indulgences. I went on with my daily duties mechanically, not even having the energy to think of fresh plans. There was just something that reconciled me to staying on in Kensington—the hope of seeing that face once more, the face of my fellow-traveller. But the hope proved delusive, and I grew weary-hearted.

Christmas drew near, and a wild longing for my home took possession of me. In my innocence, I thought that every one had Christmas holidays, and that my employers would give at least three weeks; but I soon learned that I was mistaken. When Mrs Porter paid me my three months' salary, I made my request; but was told that she could not possibly spare me just then; they were going to have grand doings, in fact a ball in the house, and my assistance would be invaluable. I chafed a good deal under my disappointment; but sought consolation in sending a few presents to my needy sisters at home.

Bessie's answer ran as follows:

AMBLESIDE MANOR, December 16.

DEAREST ARNIE—You send us visible and welcome proofs of your success, but do not tell us

enough about yourself; you never do. We want to know whether you really like the life. I hope you are not suffering from neuralgia, and that you look well. We were dreadfully disappointed to hear that you could not come home for Christmas; we had ever so many surprises and treats in store for you. First of all, I must tell you that Honeywood Chase is tenanted at last; a Mr Medway took it some time ago, and his coming has brightened us all up, I can assure you. I am so thankful that papa made up his mind to call on him. He lends us lots of music and books, and there are nice people staying at the Chase. We go there a good deal, Clarice and I. His old mother is staying with him now; but we hear he is going to be married. This is a pity, for we had arranged a little romance: you were to come home and marry him, and become the lady of Honeywood Chase. Then everything would have been *couleur de rose* for ever after. But I must not tantalise you with all this, and thank you again for our presents.

There is some talk about Mr Medway's procuring an appointment for Basil. He is evidently a philanthropist, and has turned his benevolent efforts in the direction they are most needed—that is, towards the gentlefolks, who have the wish, but alas! not the means to attain honest independence. I must say good-bye now. Everything goes on much the same.—With love from all. Your affectionate sister, BESSIE.

I put the letter away with a sad indifference. Indifference is mental loss of appetite, and its effects are most depressing. I began to wonder why I had lost the power of entering into little interests; but the perpetual: 'Miss Danvers, would you do this or that?' drove meditation to the winds.

One cold bright morning at the end of December, when, for a wonder, the whole family had assembled at the breakfast-table, Mrs Porter laid down a letter she had just been reading, with a sound something between a sigh and a gasp.

'Why does Algernon always write to you, you wicked mamma?' remarked Adelaide, stealing a glance at Amelia, who endeavoured to appear careless and dignified, but only succeeded in looking perturbed and cross.

'All our plans are upset,' exclaimed Mrs Porter, in a tone that suggested tears.

'How? Do tell us. Give it to me;' and Julia snatching the letter from her mother's hand, soon made us acquainted with its woful contents.

Mr Algernon was obliged to go to Paris on business the very week in which they had determined to give the ball, and the only alternative was either to put it off indefinitely or to give it at once.

'That is out of the question,' exclaimed the girls. 'We have not decided upon our dresses, nor arranged the invitations; in fact no preparations can be made in such a short time.'

'A bright idea has just struck me,' said Amelia, after the first burst of dismay was over. 'Have a small hop now, and put off the ball until Algernon's return; and meanwhile, mamma, we might really spare Miss Danvers for a short holiday.'

'Perhaps Miss Danvers will not care for it now?' said Adelaide, partly to watch the effect

of her words on Amelia, who was evidently most anxious for me to go.

'I should like to go home above all things; to-morrow, if convenient, I replied; 'and if you really want me to help with the ball, I will return for it; but I do not intend to dance this winter.'

'Really? How very odd! We cannot allow that. But we will leave it until the time comes. At any rate, I suppose we must allow you a holiday if you are so bent upon it,' said my employer in a patronising way.

'Well, I suppose one thing is certain,' remarked Julia—'we are in for a spontaneous hop.'

'A what?' I exclaimed, laughing heartily at the apt phrase, and nearly upsetting my tea.

'A spontaneous hop,' repeated she with a giggle. 'That means a dance to-morrow night, or next night, say.'

'Oh, I see!' I replied in quite a cheerful tone, for the idea of going home had quite revived me.

Here we were interrupted by the entrance of the great Algernon himself in alarmingly good spirits.

'Girls!' cried he, 'we must have some fun to-night. Aunt, you must knock up some refreshments. Ask the Smith-Jacksons, the Murrays, half-a-dozen other girls, and any dancing-men you know. I'll make up the complement. We'll have one of my celebrated spontaneous entertainments to-night.'

'To-night!' we all exclaimed in amazement.

'Yes; to-night. You do not manage things in this way in the country; do you, Miss Danvers?' he asked with a self-complacent air.

'No, indeed,' I answered.

'Why, she did not even know what a spontaneous hop meant!' remarked Julia.

'Ah, I hope soon to make her acquainted with all its details,' said Mr Dykes, gazing at me in an admiring and confidential manner, to my great annoyance.

'You will have to make her change her mind,' said Adelaide; while Amelia moved on to the sofa and took up *Punch*, which peeped out of the pocket of Algernon's huge ulster.

'May I?' said she, holding it up playfully.

'Certainly; I brought it for you; and this for Miss Danvers,' he said, drawing a *Graphic* from another huge pocket.

'You are very kind,' I said; 'but really I have no time for reading; I must run off to my work now;' and I handed it to Adelaide.

'We will look at it now, and you can have it in the train to-morrow,' said the two younger girls.

'Train! What do you mean?' demanded Mr Dykes sharply, as I moved across the room.

'Miss Danvers is going home to-morrow,' said Amelia in a tone of ill-concealed triumph.

'Then you must promise me one dance this evening,' he exclaimed eagerly, planting himself before the door to prevent my egress.

'You place me in the awkward position of refusing you; I do not intend to dance,' I replied, relapsing into my usual reserve.

'What can I do to persuade you; do tell me?' he asked, looking puzzled and deeply mortified.

'No persuasion could induce me to alter my mind. I like dancing; but in my present position I prefer not to join in it.'

'I know what it is,' said Amelia; 'Miss

Danvers thinks that our friends are not good enough for her. We are not so high up in society as she is; there is no denying it.'

I blushed to the roots of my hair. I could not contradict her.

'You are unkind to say such things, even if you think them,' I cried.

'Yes; I must say it is not fair play,' said Algernon, coming to my assistance, for which I mentally thanked him. 'Shew her she is wrong, by giving me a dance,' he urged.

'Very well; but that shall be my only one during the evening,' I replied, fairly driven into a corner, and much exasperated. My usual morning routine finished, I was sent up to the drawing-room to work at some evening attire, and to arrange a head-dress for Mrs Porter, while they all went out to give the invitations and to order some refreshments for the evening. Mr Dykes had disappeared as suddenly as he had appeared.

'What do you think, manna?' Adelaide exclaimed as we were partaking of a hurried lunch. 'Algernon is going to bring some swell with him to-night.'

Exclamations of surprise came from all.

'He forgot about it, but told me the last thing. He is a Mr Dennison, just come into a large fortune. I am not joking; he is really a gentleman. Algernon wants us to have everything as nice as we can.'

'Now, Miss Danvers, do you feel inclined to change your mind?' said Mrs Porter in a tone which shewed me that she had really been vexed by my determination.

'If you had all the peers of the realm at your party, I should still be your Lady Help, Mrs Porter,' I replied.

'Well, well; I can't pretend to enter into other people's feelings, of course,' said she; 'but it seems to me nothing can prevent your being Miss Danvers, or Miss Arnadine Danvers. I'm sure the name's grand enough to speak for itself. But "Live and let live" is my motto; and now you can come and help me cut the sandwiches.'

'There!' said Mrs Porter, when our task was accomplished. 'I hope these will be good enough for Master Algernon's grand friend. I never saw such a fellow to get on as that boy; he is certainly making his way in the world.'

Much as Mrs Porter loved her daughters, I had already surmised that she cherished a still deeper affection for her nephew, and that it would pain her less that Amelia should be crossed in love than that he should be a rejected lover.

When I made my appearance that night in by no means elaborate evening dress, I was greeted enthusiastically by the two younger girls.

'O Miss Danvers, how nice you look! You must dance. I must have a pattern of that dress of yours to-morrow.'

The guests were expected to arrive every moment, so I answered shortly: 'Don't tease me about the dancing, and I will cut the pattern out for you to-night, before I pack up.'

Julia, who sometimes seemed really fond of me, put her arm round me and gave me a hearty kiss, saying: 'How nice you always look, and yet you do not seem to know it a bit.'

'I'm glad you like my dress; I was afraid you

might not think it grand enough. And now I must run off and see if the tea is all right.'

Dancing had commenced with some vigour when I joined the party about an hour later that evening. Mr Dykes had arranged that our dance should take place towards the end, and I looked forward to it as to an ordeal. A good-natured looking widow was playing as I came in, and it was a pleasure to hear her. Her time and style were perfect, and yet she lingered over the most bewitching strains of the valse as only a musician can. I took possession of a vacant corner near the piano and began to watch the dancers. I soon attracted the attention of Mr Dykes, and to my surprise, directly he saw me, he rushed away from his partner and disappeared into the other room. When he returned, I perceived that he was coming across to me accompanied by another man. I did not look up, for I was angry. I was to be worried into dancing after all.

'Miss Danvers, may I introduce Mr Dennison?'

I looked up to bow, and the next moment I had almost started out of my chair. I tried to compose myself, trusting and hoping that I did not look so confused as I felt. In Mr Dennison I beheld my fellow-traveller!

He did not ask me for a dance nor did he make any commonplace remark, but simply sat down by my side, and regarding me with a quiet triumph in his eyes, said: 'I was beginning to think that you would never appear.'

'Why should you expect me to appear?' I exclaimed. 'I was never more astonished than when Mr Dykes introduced you.'

'But I have known where you lived ever since I left you at Paddington. Your address was on your bag which I took out of the carriage.'

'But you are not a friend of Mr Dykes?' I asked with more curiosity than politeness.

'Not a friend exactly, but I know him; and I happened to be in his office early this morning when he was inviting some young fellows to come here this evening. He was not able to make up the number; and I saw that he would not object to my company, so I offered to come.'

Neither of us spoke for a second or two; then the low sweet music of one of Waldteufel's valses summoned the dancers once more. My companion gazed into my face with that intense look which seems to command and to entreat, simultaneously.

'You will dance with me?' he said.

'No; I cannot,' I replied.

'Do you not know how to dance?'

Feeling rather foolish, I told him of my morning's determination.

'May I say just what I like to you?' he said.

'Yes; please do; perhaps you may help me.'

'Well, putting the present question aside as immaterial, I think you have made a mistake from the first. You have accepted a false position, and have chosen to employ the lower instead of the higher attributes of your nature.'

'Yes; you are right,' I answered sadly. 'I have often felt all this, though I could not have expressed it, even to myself. Do you think I ought to have been a governess, instead of a Lady Help?'

He smiled. 'I doubt if you were justified in taking upon yourself to be any one but yourself; but as you suggest, the office you hold here might be filled by a woman of far less education than

you possess. It is not right that you should look your brains up in a box, and perform the work that hands without brains might do. Do you see what I mean?'

'Yes. But was I not right to try and earn some money?'

'Not unless you were obliged; and that, you told me in the train, was not the case. I will lend you Kingsley's *Life and Letters*, and you will see what he says about the duties that lie nearest.'

'I should certainly like to read them; but I am going away to-morrow for my holidays; I may not see you again.'

'Are you going home to-morrow?' he exclaimed in a tone that betokened real delight; and he seemed about to add more, but checked himself; and I, watching his countenance, wondered to see it change so suddenly from grave to gay.

'Yes, I am really going home; but I should like to have had the book,' I said; 'I shall have plenty of time for reading at home.'

'Are you sure of that? Will there be no winter gaieties to engross you?'

'Oh, I believe there is to be a ball at Honeywood Chase; but that will not make much difference to me.'

'Do you not care for such festivities, then?'

'I do not know; everything seems indifferent to me now.' As I spoke, my eyes met his, and I feared lest they had betrayed to him the secret of my indifference to ordinary pleasures. The colour rushed to my cheeks, and I began to play nervously with my fan. He rose, took my hand, drew it through his arm, and led me into the other room. Here we were met by Mr Dykes, who informed me that he should claim me for the next waltz, so I knew I was only to have a few minutes more with Mr Dennison. A vague feeling of regret seized me, for I feared that after that evening I might never see him again, never more listen to his counsel, nor feel gladdened by his smile. Perhaps I might look back to this evening of my life only as the aged do to the brightness of their youth. Still these sad presentiments were overpowered by the actual delight of his presence as we stood arm in arm silently watching the dancers. Then I went off for my dance with Algernon, which I enjoyed after all, for he really waltzed well. What followed was not so pleasant. 'I think I may as well scratch my name off, Miss Danvers; I haven't a chance,' said he despondently.

'What do you mean?' I asked.

'Oh, directly that fellow asked to be introduced to you, I knew which way the wind blew. An old friend, of course. Did you know he was coming?'

'You are mistaken, I assure you,' I said. 'I met Mr Dennison for the first time the day I travelled up here; I shall probably never see him again. I did not even know his name until you introduced him to-night.'

'That does not surprise me. He has only lately taken the name of Dennison, since he came into some money. He has bought a fine estate somewhere in your part of the world. Well, Miss Danvers, you have my best wishes; and before long I may ask for yours when Amelia'—

'I wish you would not talk in this manner. I hate it.—Oh, I am so glad I am going home to-morrow!' I exclaimed involuntarily.

'Yes; I've said all along you were a step too high for us.'

'Oh, I'm sure I did not mean that; but you provoked me, Mr Dykes.'

'Well, never mind. Sit down and rest now; and I daresay you will not have to wait long for some one to talk to.'

This vulgarity alarmed as well as disgusted me, for I feared lest Mr Dennison should overhear it; fortunately he was not near enough to do so. I sat there for about an hour, feeling myself to be proud, ill-tempered, and miserable; for Mr Dennison was dancing, and in my heart I longed to be dancing too. My spirits sank still lower when he came and wished me good-bye. I longed to say: 'Shall I ever see you again? Is this the end, which I feel to be but the beginning of life?'

He handed me a scrap of paper. 'I have scribbled down one sentence of Kingsley's which struck me forcibly when I read it; perhaps it may be useful to you. Good-bye.'

'Good-bye,' I said mechanically. I had half-hoped he would have sent me the book, and that it would have been a means of future communication with him; but I was disappointed, and he left me without another word.

I now pleaded an excuse to retire. I was really fatigued, and had to start early in the morning. As soon as I was alone, I unfolded the paper, and read as follows: 'The only way to regenerate the world is to do the duty which lies nearest, and not to hunt after grand, far-fetched ones for ourselves.'

These words spoke to me strongly of the mistake I had made, as did also my dearly bought experience; and I resolved to inform Mrs Porter that it was not my intention to return.

I was really sorry to say good-bye to them all in the morning; and although I had spent the most miserable hours of my life under their roof, my happiest moments had been spent there also—only a few hours ago. They heard of my determination good-naturedly, and seemed pleased when I offered to come and see them as a friend some day. On the whole, they had treated me with great kindness, and their ways and manners were those of their own class. I had laid myself open to annoyance by needlessly stepping down from my position to assume that of a Lady Help. Such an individual must always be an anomaly. Moreover, I had conjectured that my help was to be given to ladies who would work with me; but instead of this I had been chiefly employed in assisting the General.

Poor General! She shed bitter tears at parting with me, but brightened up at the last, saying: 'It won't be slaving for me much longer, miss; for Joe's got the driving of one of them Hammer-smith 'buses with the white horses, so you'll find me "General" in a little home of my own when you comes again.'

They all accompanied me to the station; and at the last moment Mr Dykes appeared on the platform with a huge bouquet of exquisite flowers, which he presented to me. As I waved my adieux, and the train slowly glided out of the station, I saw Amelia Porter disappear on the arm of Mr Dykes, and said to myself: 'All's well that ends well.'

I did not find myself the all-engrossing object of interest that I fancied I should be when I got home, for they were all in a high state of excitement about the ball at Honeywood Chase. It was to be on the following Thursday, and I had but little time to prepare for it. I did not even announce my intention of not returning to the Porters; and in the general bustle I escaped questioning, for which I, in my cowardice, was grateful.

'You look thinner and older,' said Bessie, as we gathered round the fire in the same room where, so short a time ago, I had taken upon myself 'to shape my own destiny.'

'London is very different from the country,' I remarked vaguely; turning away my face, for fear a conscious expression might be written thereon. How little they knew that the whole world, every little trivial thing had been altered in my eyes! I was no longer the same Arnadine who had sat in that room when the leaves were beginning to fall from the trees; I had commenced a new inner life; I had awakened to fresh thoughts, keener aspirations, and above all and beyond all, I had learned to love!

'Well, Arnadine, I never thought you would have come home from London without a gown fit to wear at a ball,' said Clarice, who was eagerly turning over a book of fashions.

'I don't think she wants to go at all,' said Bessie.

'Why should you say so?' I retorted, with a sharpness produced by a painful consciousness that she was speaking the truth. 'You seem to think that I take no interest in anything; but it is only natural that I should not be so excited as you are about this ball. I do not know, nor care to know, this man with whom you are so infatuated; he is too good-natured. I hate people who are always lending you things—stuffing their good-nature down whether you want it or not.'

'But we do want it; and we like it; and so will you when you get a taste of it. But perhaps you will refuse game at dinner to-night, because it came from Honeywood Chase.'

'Well, don't let us quarrel,' I said with a gulp; 'and I will do my best with that white muslin. I suppose it will do?'

'Have you told her?' called out Basil, poking his head in at the door.—'Have you heard, Arnadine, of the honour that awaits you?'

'No. What is it?' I asked, somewhat aggressively, looking from one to the other.

Upon this Basil came in, and perching himself on a chair, asked with a bantering air: 'Have you seen any one you like better than yourself during your absence, Arnadine?'

He looked very mischievous. I fancied that in some unaccountable way he had become possessed of my treasured secret. 'That is no business of yours,' I cried, growing crimson with shame and vexation.

'Ah, my child, it is a pity; but you must throw romance and sentiment aside, and go in for nineteenth-century common-sense; so stifle your recollections of this youthful Potter or Porter.'

'How can you tease so?' said Bessie, seeing that I looked really distressed.

'Why do you talk so absurdly?' I exclaimed.

'I can assure you that your preconceived dislike to Mr Medway is not reciprocal,' went on

Basil. 'The Pater had a letter from him to-day on business or something; and at the end he said this: "If your eldest daughter has returned, will you ask her to honour me with the first dance on Thursday evening?"'

'Stupid old fellow! Just because I am the eldest, I suppose.'

'But he's not old. Wait till you see him,' exclaimed Clarice.

'What is he like then?' I asked, feeling bound to display a feeble curiosity about the man, who at this Christmas-time had assumed the office of Santa Claus in our family.

'There is nothing remarkable about him,' said Bessie, 'except that he is *awfully nice*; the sort of man you read of in a book, you know; quiet, but with a certain depth and cleverness.—But description is useless; on Thursday you'll see for yourself. He only returned from town late last night.'

'Yes, wait till you see him,' repeated Clarice.

Wait! I did wait until I lost my small stock of patience. On that eventful Thursday evening, we started for the ball in good time. Bessie was in high glee; and even I had contrived to throw off my depression, and allowed myself to feel elated at the prospect before me. When we stepped out of the carriage into the brilliantly lighted hall, the whole place seemed to me like fairyland. The walls were draped with crimson cloth, and mirrors festooned with the choicest flowers were hung at intervals in the anteroom. The music as yet came but in snatches. I felt in a kind of happy dream. But when we entered the ballroom and the quadrilles began to form, the tuning of the musicians burst into melody which displayed impatience. Every one seemed to be waiting. I was waiting too. My mother was busily engaged in conversation with a friendly dowager; and I, tired of looking for my unknown partner, who came not, was indulging in that sweetest though most dangerous of pastimes, retrospection. The witching sound of the music, the scent of the flowers, the low hum of voices, all conspired to carry me into fancyland. But was it in that imaginary world, and there alone, that a voice sounded in my ears, a voice I knew and loved? Some one was bending over me, and it was his voice that said: 'Will you come?'

I looked up; and seeing my fellow-traveller before me, my eyes told him I would come, ay, come to the end of the world at his bidding! I could not utter a word; but he had already clasped my hand within his arm, and was leading me to my place among the dancers.

'You are surprised,' he said, 'to find that I am the master of Honeywood Chase.'

'Yes,' I answered breathlessly. 'I thought I should never see you again.'

'I could not have borne that,' he replied in low deep tones. 'You made a victim of me from the first moment I saw you.'

'How?' I asked, speaking at random, feeling too happy and confused to know or care what I said.

'I will tell you when this is over,' he whispered.

When that time came, he led me away into a deserted conservatory, and leaning over me, said: 'I loved you at first sight, and I love you now, Arnadine. I have plotted and arranged this

for months. You shall never go back to the Porters.'

'I never intended to,' I replied quickly. 'I could not have gone on with what *you* thought a mistake.'

'Did I influence you as much as that—I, almost a stranger to you?'

'I suppose I was a victim from the first too,' I said, burying my face in my bouquet.

'You little thought that Mr Dennison and Mr Medway were the same person?'

'No. I thought that Mr Medway was a person I should dislike very much.'

'And you do not dislike him after all?'

'You know I do not.'

'Will you be my wife, Arnadine?'

'Can you forgive me?' I replied, hiding my head on his shoulder.

'What for, my darling?'

'For being a Lady Help!' I murmured.

'O my brave, true, earnest Arnadine!' returned he, 'should I ever have known you so well, or loved you so much, had I not learned from yourself that you did not look upon the world only as a big playground, but took life seriously, and were willing to work! Only you set about it in the wrong way, my darling. Now your work will always be at my side.'

No answer in words came from me, but my happiness was complete. It could not be hidden from any of the eyes that followed me with wonder, and perhaps a little envy, throughout the evening; and it soon became known that I was Mr Medway's affianced wife. The news was also spread that he had taken the name of Dennison.

Some months after our marriage, we invited all the Porters to come and stay with us, and made them very welcome; for we could never regret that I had once tried to be a Lady Help.

MORE ABOUT ELECTRICITY.

DISCOVERIES and improvements in connection with new applications of electricity are of frequent occurrence, and have already been referred to in this *Journal*. In inviting further consideration of this subject, some better idea may be formed of the grand and valuable results now achieved by this powerful agent, results undreamed of by Franklin when he made his celebrated little experiment with the kite-string.

Prior to the general use of lightning-conductors at sea, accidents to ships were of common occurrence. Though the possibility of conducting an electric current by means of a metal rod had been sufficiently demonstrated, the insulation and arrangements for discharging the fluid were only at first imperfectly understood. When therefore some vessels fitted out with newly invented lightning-rods were struck and injured quite as frequently as before, the sailors called them 'lightning-traps;' and the notion grew that all conductors increased rather than diminished the danger from the electric fluid. Owing to the failure of these early attempts to protect ships from a peril which has often proved so serious, lightning-conductors were for many years dis-

credited; and it was not till 1842 that they were adopted throughout the navy, since which our fleet may be said to have been practically exempt from damage by lightning.

The large iron vessels of these days offer peculiar attraction to the electric fluid, an instance being lately furnished by the experience of the ship *Yorkshire* when voyaging from London to Melbourne. The vessel was overtaken by a heavy thunder-storm, in the midst of which the lightning was seen playing all round the ship in various shapes. Large drops of liquid fire apparently fell amongst the sailors who were reefing sails. Though no injury happened to the sailors, the ironwork on the mast was fused, and the woodwork blackened, and a yellow deposit resembling sulphur covered part of the yard. Whether the ship was provided with a lightning-conductor is not certain, but vessel and crew must have had a narrow escape from destruction. Another vessel when on a voyage to Bombay not long since, was struck by the electric fire, which instantaneously melted large quantities of the ice which formed part of her cargo.

In a French agricultural paper, the discovery is announced of a very simple and cheap means of protecting buildings, said to be very effective. The apparatus consists simply of bundles of straw attached to sticks or broom-handles, and placed in upright positions on the roofs of houses. In consequence of the success of this experiment, eighteen communes of the Tarbes district provided their houses in this manner against the effects of lightning; and we are told there have been no accidents in the district since. French *para-grèles* are also other forms of lightning-rods. They are small conductors set up by means of poles in the vineyards in France, to draw off the electricity from the atmosphere over them, and thus prevent the accumulations which, when they occurred, were found to generate hailstones.

With regard to the telephone, M. D'Arsonval has compared that delicate instrument with the animal nerve as an indicator of electricity. According to that gentleman, the poorest telephone is at least a hundred times more sensitive than the nerve. In the silence of the night he has heard the telephone vibrate when the induction coil was removed to a distance fifteen times greater than that of the minimum nervous excitation; indicating a sensibility more than two hundred times greater. He regards the telephone as the best of all galvanoscopes, both for feeble electric variations and for feeble continuous currents. Claiming attention among recent inventions in the way of telephones is one by Mr J. Ewing and Professor F. Jenkin, suited for the transmission of two or more messages simultaneously in either direction along the same wire. It has wires capable of vibrating to definite musical notes, and the wires are so turned that one wire or group of wires at each end is in unison with one wire or group of wires at the other. When one wire or group is made to

vibrate at the sending end, the wire or group in unison will vibrate at the other end, but the other wires will remain practically silent. By having a number of pairs or groups, means are afforded of transmitting independently a number of audible signals at the same time along the same line without interference.

Interesting exhibitions of the microphone, by which the most minute sounds become distinctly audible, have been followed by experiments with an instrument termed the megaphone. This invention in fact appears to do for the ear very much what the binocular will do for the eye. We are told that 'it can be taken to a theatre by a person hard of hearing, just as a person now takes his opera-glass. All you do is to place it on your lap, let the tube touch your ear, and all sounds come to you magnified fifty times if necessary. The loudness can be regulated for the ear as you regulate a telescope for the eye.' From this it seems likely that the megaphone, for those who are deaf, will come to be as indispensable a personal appendage as spectacles for those whose vision is defective. The inventor has, we are told, been inundated with applications from deaf people; but any person of ordinary hearing who happened to apply one of these instruments to his ear in time to hear a salvo of artillery or a clap of stage-thunder magnified a few score of times, would scarcely, we presume, be anxious to repeat the experiment.

When we consider how quickly these startling results of the applications of electricity in various forms have followed one another, it is almost impossible to imagine the future that is yet in store for this potent agent. This will easily account for the report of the invention of the 'telegastograph,' by which the flavour of any food or liquor can be transmitted to the palate from any distance; which does not seem such a very fanciful idea after all, when we reflect on what wonders have lately been achieved by means of electricity. To enable a man to enjoy a banquet without the expense of paying for one, would indeed be a triumph of science, and a realisation of human felicity probably undreamed of by the most sanguine sybarite!

Some valuable practical applications of the discovery of a new method of electro-plating are said to have been made by Professor A. W. Wright of Yale College, New Haven, Connecticut, which are certainly interesting and remarkable, and according to the *American Journal of the Telegraph*, promise to be of great utility. Taking advantage of the fact, that the various metals may be reduced to vapour by the electrical current, he provides a hollow vessel from which the air is partially exhausted; within this vessel he arranges, opposite to each other, the two poles of an induction coil; the article to be electro-plated, a bit of glass for example, is suspended between the poles; to the negative pole is attached a small piece of the metal that is to be deposited on the glass. From three to six pint Grove cells are employed, yielding by means of the induction coil an electrical spark from two to three inches in length. Under the influence of this spark, a portion of the metal of the electrode is converted into vapour, or volatilised, and condenses upon the cooler surface of the suspended glass, forming a brilliant and uniform deposit. The thickness of the plating thus

produced, may be regulated at will by simply continuing the action of the electricity for a longer or shorter period. That the metal is actually volatilised is proved by the examination with the spectroscope during the progress of the operation, the characteristic 'lines' of whatever metal is used for the electrode being fully revealed. In short, this interesting discovery consists in plating the surface of substances with metals by exposing such surfaces to the hot vapours of whatever metal it is desired to plate with.

A simple, cheap, and efficient method of working punkahs, likely to supersede all other methods of keeping these useful contrivances in continual motion, is said to have been recently patented. By means of an electric motor, punkahs, so essential to the Anglo-Indian in his stifling bungalow, can be worked at the cost of a few pence daily; and being very moderate in price it is probable that it will ere long be largely employed in military establishments and private residences throughout our Indian Empire. It is thought that the motor can be employed for innumerable purposes, such as the working of sewing-machines, organs, harmoniums, and so forth; and when its merits are more widely known, will probably be in great demand.

Electricity has now become useful in protecting life and property by means of other agencies than lightning-conductors. A safe has recently been patented which is ingeniously connected with a battery and alarm apparatus, so as to defy all attempts of burglars in drilling, picking, or removal of the safe without instant detection. Any improved contrivances by which the dangers of railway travelling are diminished will be hailed with satisfaction, and in the furtherance of such improvements electricity again claims our attention. An instrument for stopping trains in foggy weather without any chance of error has been devised by French engineers. It consists of a metal-faced disc rising out of the permanent way between the lines of rail, and placed so that any engine going along the line must brush against it as it passes. The engine is provided for this special purpose with a brush made of iron wires, which has an electric communication with the handle of the whistle. It is thus only necessary, in order to bring the train to a standstill, to pull from its recumbent position the disc, or 'crocodile' as we believe it is called, when the train in passing must naturally come into contact with it and give itself its own danger-signal. This system is said to have some great advantages over the fog-signals in general use.

Of the various inventions in which electricity is the chief motor we have another example in Mr Peppard's curious contrivance for awakening a sleeper at any required hour. According to the *Electrician*, the apparatus is to be fixed to an ordinary clock, and is so arranged that when the hour-hand of the clock touches a button, an electric circuit is completed; the minute-hand passes over the button without effect. There are a series of holes for the different hours, into any one of which the button can be pushed according to the time selected for awakening. The completion of the electric circuit may ring a bell or sound any other ordinary method of alarm. And amongst other curious applications of this power, we may allude to the certain

detection of impostors feigning paralytic affections in order to escape punishment, by the judicious administration of a few smart electric shocks. In such cases the curative properties of electricity are wonderful!

But it is the electric light, now receiving so much attention from experimenters, that is likely to produce some of the most startling results, and promises to be of greater general utility than perhaps any other uses of electricity we have mentioned.

Some two centuries ago, the first public lantern in Paris (containing a candle) was put up—a feeble forerunner of the dazzling spectacle now offered by the Avenue de l'Opéra and other places, where the brilliant sheen of the electric light excites universal admiration. The application of the electric light is in Paris daily extending; but no attempt was made in London and elsewhere to imitate French enterprise till long after Parisians were familiar with the new light.

Invention is busy with several ingenious substitutes for gas, and men of scientific ability are working energetically with a view to supersede gas by electricity. They have not yet attained that desideratum, and a good deal must doubtless be accomplished before the new light will become available for the general illumination of private houses. As a means of public illumination the new invention is obviously a success, and according to some authorities, is much cheaper than gas. Mr Hollingshead says that the French scientific gentlemen who manage the light for him at the Gaiety Theatre in London, declare that with machinery valued at three thousand four hundred pounds, they are prepared to light an area of one thousand five hundred and forty yards long by forty-four yards wide, with thirty-six electric lamps, having an illuminating power equal to two thousand of our existing street-lamps at a cost of ten shillings and sixpence per hour for consumption and superintendence.

The new light is not only vastly superior to gas, but it is not injurious; and there is an absence of noxious smell both in the production and combustion; and heat in a room, so often unbearable in the case of gas, is scarcely felt; the most delicate colours are preserved, and there is no chance of an explosion. A great deal of time and expense would also be saved by the instantaneous lighting and extinguishing. On the other hand, it has been contended that the present arrangements for electric lighting are unsuitable for long distances. Still, if unsuitable for general street-lighting at present, it can be utilised with splendid effect in large squares and public buildings, and we must recollect that the electric light is as yet in its infancy. Nevertheless, the difficulties of electric lighting will doubtless be overcome, though in the opinion of Dr Siemens, a practical scientist, gas and electric light have two separate circles to move in, and these will rarely if ever interfere with each other.

According to report, it has been reserved for Mr Edison, the indefatigable scientist, to solve the problem that has puzzled many scientific men; we mean the division of the electric light into many smaller ones, for purposes of cheap and practical illumination. As our readers already know, he proposes to utilise the gas-burners and chandeliers now in use. In each house he intends to place a

light meter, whence the wires will pass through the house, tapping small metallic contrivances that may be placed over each burner. Whenever it is desired to light a jet, it will only be necessary to touch a little spring near it. No matches will be required.

The same gentleman promises that as the wire that brings light will also bring power and heat, you can work a sewing-machine or any other mechanical contrivance that requires a motor; and by means of the heat you may cook your food. To utilise the heat, it will only be necessary to have the ovens or stoves properly arranged for its reception, which can be done at a trifling cost.

Such are a few of the most recent applications of that subtle power which ere long will doubtless revolutionise many of the world's present appliances.

CHASING SLAVERS.

IN the early part of 1863, Her Majesty's steam-corvette *Zebra*, carrying fifteen 32-pounders (smooth-bore) and two 40-pounder Armstrong guns, lay off the west coast of Africa at the mouth of the Congo River, in latitude about six degrees south. She had been sent to this forlorn and uncivilised region to repress as far as possible the growing slave-traffic, which was at that time assuming formidable dimensions. To one who has never experienced the tedious monotony of blockade duty under the burning sun of the tropics, the most vivid description will fail to convey adequately a realising sense of its intolerable dullness. With a temperature of some eighty degrees Fahrenheit by night, and one hundred degrees or thereabouts by day, men naturally possessed of the most active and energetic temperaments find it impossible to resist a feeling of lassitude. The eye tires for ever gazing on the lazy swell of the waves; the ear becomes fatigued by the ceaseless splash of water against the hull; in fact all the senses are wearied and dulled by only a few weeks of such an existence. Occasionally, if not at too great a distance from the coast, hunting or fishing parties may be organised; but even these recreations demand too much exertion to be frequently participated in; so that by far the greater portion of the time will be passed idly lounging on deck beneath the awning, watching the hot pitch bubble from the seams during the day, and after nightfall the peregrinations of the immense winged cockroaches with which all vessels abound in hot latitudes. O ye who complain of the monotony of a ten days' trip across the Atlantic, surrounded with all the luxuries of a first-class hotel, how your patience would be tried were you condemned to pass a few months on board a blockading vessel in the vicinity of the equator!

It was under such circumstances that positive information was received of the shipment of a cargo of some fourteen hundred negroes about thirty miles up the river. The consequent excitement on board our vessel may be imagined. For some time back we had known that a large barque named the *Ocilla* was anchored off a place called Ponta de Lenha, ostensibly engaged in legitimate traffic with the natives. Our suspicions however, had been awakened that her errand was of an

entirely different character, and one which it was both our duty and our interest to prevent. The confirmation of these suspicions was therefore no surprise. Convinced that she was only awaiting an opportunity to elude our vigilance and get to sea, we took up a position off Shark's Point, the southern bank of the entrance to the Congo, feeling certain that both ship and cargo would shortly be in our possession. Had any person on board the *Zebra* at that time intimated the possibility of her escape, he would have been considered guilty of high-treason. But alas! for 'the best-laid schemes of mice and men.' At sunset all deck-lights were extinguished; the scuttles tightly closed with blankets, clothing, &c., that not the least ray of light might betray our position, and every precaution used that foresight and experience could suggest. All proved unavailing. In the darkness of the night, rendered still more obscure by the overhanging foliage on each bank of the river, the *Ocilla* silently dropped down with the current, which here runs at the rate of seven knots an hour; and at daybreak we had the mortification of learning that our prey had escaped, and was far away to the westward. I may here mention that both the volume and the velocity of the Congo are so great that its course may be traced for nearly five hundred miles at sea by the discoloration and freshness of the water. Knowing she would take advantage of this, the wind also being in her favour, we followed in pursuit as rapidly as possible, but only to return disappointed, fully convinced that the fastest vessels, the best seamen, and most skilful officers were engaged in this nefarious traffic. To add to our chagrin, a smaller vessel, the *Mondego*, taking advantage of our absence, followed our track until well out to sea, when changing her course, she too managed to escape with a load of negroes.

Several months elapsed, and our disappointment had not yet ceased to be a topic of conversation, when just at daybreak one morning, as the fog cleared away, the look-out at the mast-head descried a strange vessel on the horizon. Steam was immediately got up; and under full speed, with all available sail set, we gave chase, determined not to lose our prey this time if possible; her actions indicating clearly that our appearance was far from gratifying to her. Coal was piled in the furnaces, and amidst the utmost excitement, we found the distance between us slowly decreasing; but so slowly, that the chase would have been a long one, had not the wind, which so fortuitously cleared away the fog in the morning, thus making the stranger's proximity known to us, now begun to diminish in force. She proved a fast sailer, going at the rate of fully a dozen knots per hour; and though our engines became so overheated that a portion of the crew were detailed to drench them with water, still our progress was unsatisfactory. About noon, the breeze, on which her salvation depended, failed almost entirely; we then made her out to be a top-sail schooner of about two hundred tons burden, flying Spanish colours.

Nearer and nearer we approached, the excitement of officers and crew increasing as the certainty of overhauling her became apparent; when within five miles, a blank cartridge was fired to bring her to, but no attention paid to it. This

was followed by a more urgent invitation on our part in the shape of several solid shot; when finding her situation hopeless, she let fly her sheets, hauling down her colours at the same time, and sullenly resigned herself to her fate. On arriving alongside, our cutter was manned by an officer and half-a-dozen blue-jackets, who at once boarded her; and in a very few minutes we had the satisfaction of seeing the British ensign flying from her peak. Four hundred and eighty-five negro men and women were found crowded between decks. These poor wretches had been shipped at Cabenda only the day before, and thanks to our vigorous pursuit, no time had been allowed to stow them in the ordinary painful and torturing position. When it is known that vessels specially fitted out for this traffic have a space of only about three-and-a-half feet between decks, that the poor creatures are placed in rows packed closely against each other in a squatting position, and with no opportunity for exercise or fresh air, some faint idea of their sufferings may be formed.

Our prize was supposed to be the *Maraquita*, which had been fitted out at the London Docks with an assorted cargo for Lisbon, and when cleared, was apparently bound on a legitimate voyage. As usual in such cases, no person on board would acknowledge to being the captain; the officer in charge representing himself as the supercargo. It afterwards proved however, that he was the notorious Captain Bowen, unquestionably the shrewdest sea-captain ever engaged in the slave-trade; one who united in an extraordinary degree both caution and daring; unequalled for pluck, determination, and power of resource in cases of emergency; the man who on one occasion had successfully resisted an attack by the boats of the United States man-of-war *Saratoga*; and as we learned, the same who had commanded the *Ocilla* when she so provokingly gave us the slip. On that occasion he had volunteered to run the *Ocilla* out through sheer love of adventure, her regular commander not possessing sufficient nerve to brave the stringent blockade, and consequent risk of capture. When this was made known, we felt in some degree recompensed for our former disappointment. The *Maraquita*, containing her miserable freight, was sent under a prize crew to St Helena, together with her self-styled supercargo and one of her seamen who had been permitted to remain on board. Illustrative of the character of this noted slave-dealer, I may state that on the voyage thither he actually entertained the scheme of recapturing his vessel and cargo—a fact which he afterwards admitted, and which no person who knew the character of the man had reason to doubt.

That the escape of the *Ocilla* and *Mondego* was not attributable to any want of vigilance on the part of Her Majesty's officers, the following incidents will prove. So closely were the slave-dealers watched, that many of them despairing of escaping with their human chattels, and being unable to provide them with food, actually hastened their deaths by poison. And again, in the case of the *Ocilla*, she had been compelled to discharge her cargo of slaves more than once at Ponta de Lenha, and afterwards reship them, before her final successful voyage. Moreover, there has seldom if ever been a period during which the

slave-trade was as active as at that time; or so much money and diabolical ingenuity used to defeat the efforts of those engaged in its suppression. It is now however, being rapidly abolished, and at the present time is confined almost exclusively to Spanish and Mussulman dealers.

GERMAN HEROES.

WHENEVER two nations have been at war, the fame of the most striking acts of heroism on either side spreads all over the civilised world; newspapers mention the names of the generals and commanders, history takes possession of their career, which future generations admire, and point to as examples of heroic bravery. Whilst according all due praise to their commanders, perhaps a few instances of daring on the part of the subordinates may not be out of place. For the following instances of German intrepidity we are indebted to a lady whose friends were engaged in the Austro-German war.

In the battle of Königgrätz, on the 3d July 1866, the Austrians, whose positions were most favourable for defence, occupied the numerous wooded hills between the banks of the Elbe and Bistritz, from which sheltered places they fired with impunity at the defenceless enemy marching in the open plain. The Prussian commanders, perceiving how much blood would be wasted if they allowed the enemy to retain his favourable positions, ordered their troops to attack these dangerous ambuscades. One regiment belonging to the seventh division, under the command of the celebrated General Frauseky, as it advanced towards an Austrian embankment was greeted by such a shower of bullets that the colonel's horse was killed on the spot, and several men were likewise shot or severely wounded. But the brave regiment struggled on, the colonel and the major leading. The latter, a Herr von Gilsa, when turning round to give an order was shot through the side and thrown off his horse. The pain he suffered was intense; but seeing the colonel dismounted for the second time, he gathered all his strength, raised himself from the ground, and leaning on a drummer's arm, he commanded the whole regiment, his voice husky with the agonising pain.

After about half an hour's violent fighting, the regiment was forced to withdraw; but the valiant major, who had meanwhile been lifted on horseback, led them on again, and the Prussians took the position. One of the last bullets the retiring enemy fired lodged in the major's breast and proved fatal, although death was not the immediate result of the shot. When he found himself on the box of a carriage, a sergeant of his battalion supporting him, he said: 'I know I shall not recover, but I rejoice that we have gained.' The surgeons at the hospital whither he was brought declared his case to be hopeless. Then he—always full of regard for others—entreated them not to place his name in the list of the severely wounded, so that his wife and children might not be alarmed. He hoped to live some time longer; and his ardent desire was to be conveyed home; but mortification setting in, he expired that same

night. A letter written by the colonel of the regiment to the widow of the deceased, expressed the heartfelt sorrow and the esteem akin to veneration which all his comrades professed for that man, who by his life and death had set them a glorious example of true heroism.

At the same battle of Königgrätz, a regiment of hussars had captured a body of Austrians. As they were laying down their arms, one of the prisoners took up a rifle from the heap of weapons on the ground and aimed at Lieutenant Count Schulenburg; but before he had time to fire, his treacherous design was discovered by some hussars, who in their indignation pressed around him sword in hand. The noble lieutenant, wishing to save the traitor's life, interposed, quietly ordering him to put down the gun; instead of which the villain shot him in return for his humane sentiment. A sad instance of unrequited heroism.

A Bavarian officer had received orders to clear a thick forest of the Prussians who occupied it. He saw the impossibility of succeeding with only a body of cuirassiers at his disposal, and respectfully informed his chief of his doubts. The latter coolly told him to choose between the fulfilment of his order or resigning his post. Thereupon the captain rode up to his squadron and addressed his soldiers in the following terms: 'Comrades! we are to take yonder forest. That is impossible, and I will not allow you to be slaughtered; but I will prove that I do not fear death.' With these words he shot himself before his men.

Honour to whom honour is due. The band, whose strains inspire courage even in the timid, is generally placed behind the troops in action, so as to be sheltered from the enemy's fire; but when the battalions separate and advance in troops, the musicians' position becomes critical, and sometimes flight alone may save them. In the same battle it happened that the band of the 67th Regiment was cut off from their battalions and discovered to the enemy, who immediately attacked the defenceless musicians. They were almost unarmed, and in the desperate struggle which arose, some fought with their musical instruments for weapons. Many were wounded, several killed—amongst the latter two intimate friends, one a married man; the other one charged by the anxious wife of the former to take good care of her husband and to watch over him. His promise that either both or none should return proved a true prophecy; the faithful friend was killed when endeavouring to ward off the blow which an Austrian soldier was about to deal on the other man's head. He sank down, calling out: 'I do not surrender!' and expired. The Austrians challenged the surviving men to lay down what arms they had; but Germendorf was intent on revenging his friend; refusing to surrender, he fought like a lion, till several stabs from the bayonets and a shot in the side laid low the hero.

In every regiment, similar acts of heroism have been performed by men, who in consequence are looked upon by their comrades with envy and admiration. At night, when the brave soldiers gathered round the watch-fires in the silent camp, and rested from the day's hot labour—thankful that their lives have been spared—thousands of noble deeds were narrated by those who had witnessed them. Those tales went from mouth to mouth, and served to cheer the drooping spirits

and to double the courage of the hearers, and inspired them with the desire of imitating examples, such as that of the brave gunner who stuck to his cannon though a fragment of a shell had carried off one of his legs; or that of the drummer, a lad scarcely seventeen years old, who went on beating his drum, holding one stick between his teeth, when his right hand was shot off.

Such wonderful proofs of valour are by no means isolated, for the spirit that prevails in the German army is one of true heroism, perfect union, real patriotism, and blind obedience to the leaders; each individual staking his whole force, good-will, nay his life, for the benefit of the whole, and the success of the ideal for which he is fighting. Be it his liberty or his fatherland, the German soldier will always do his duty, and know how to conquer or die as a hero.

THE FIRST SNOWDROP.

'DEAR little flower! dost thou not fear
To venture forth this dreary day?
Thou shouldst have slumbered snug and warm
Till winter-storms have passed away.

'Thou art so delicately fair,
So sweet, so tender, and so pure!
Thou look'st as if thy fairy form
A summer breeze could scarce endure.

'Thy lovely sisters sleeping lie,
And will not wake till sunshine smiles;
Nor will they leave their Mother's breast
Till coaxed by Spring-time's merry wiles.

'Then wherefore dost thou lonely brave
The biting blast, the chilling rain?
Thou hast no pleasure in a life,
Quoth I, 'that must be full of pain.'

The snowdrop raised her dainty head,
And looked at me, and seemed to smile—

'Who art thou that thus vainly tries
From Duty's path me to beguile?

'Dost thou not know we must obey
Unquestioning, the Chief's command!
It is not ours to choose our lot;
Our destinies are in His Hand.

'And if He hath ordained that I
Shall bloom alone, when days are drear,
Shall I refuse to do His will,
From sinful sloth or foolish fear!

'Nay! Rather shall I do my best
To serve my Maker as I may;
And duty done for His name's sake,
Shall brighten e'en the darkest day.'

Dear little flower! I thank thee for
The grand example thou hast set;
The lesson thou hast taught to me,
I pray I never may forget.

E. M. D. B.

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